UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

NOTICE OF ALLOWANCE AND FEE(S) DUE

28107

7590

05/05/2008

JORDAN AND HAMBURG LLP 122 EAST 42ND STREET SUITE 4000 NEW YORK, NY 10168 EXAMINER

MCMAHON, MARGUERITE J

ART UNIT PAPER NUMBER

3747

DATE MAILED: 05/05/2008

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/551,708	10/03/2005	Kenji Fujii	F-8832	3875

TITLE OF INVENTION: DEVICE FOR ENHANCING COMBUSTION EFFICIENCY

APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	YES	\$720	\$300	\$0	\$1020	08/05/2008

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above.

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and 1/2 the ISSUE FEE shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail Mail Stop ISSUE FEE

Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450

or <u>Fax</u> (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where m

maintenance fee notifica	tions.			_			orrespondence address as ate "FEE ADDRESS" for	
CURRENT CORRESPOND	Fe pa	Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.						
28107		5/2008		Ce	rtificate	e of Mailing or Transm	nission	
JORDAN ANI 122 EAST 42NI SUITE 4000	I I St ad tra	Certificate of Mailing or Transmission I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.						
NEW YORK, N	Y 10168		Γ				(Depositor's name)	
							(Signature)	
							(Date)	
APPLICATION NO.	FILING DATE		FIRST NAMED INVENTO	R	ATTC	RNEY DOCKET NO.	CONFIRMATION NO.	
10/551,708	10/03/2005	•	Kenji Fujii		F-8832		3875	
TITLE OF INVENTION	: DEVICE FOR ENHA	NCING COMBUSTION	EFFICIENCY					
APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DU	E PREV. PAID ISSU	JE FEE	TOTAL FEE(S) DUE	DATE DUE	
nonprovisional	YES	\$720	\$300	\$0		\$1020	08/05/2008	
EXAM	IINER	ART UNIT	CLASS-SUBCLASS					
MCMAHON, M	IARGUERITE J	3747	123-538000					
1. Change of correspond CFR 1.363).		`	2. For printing on the (1) the names of up			nevs 1		
Change of corresp	ondence address (or Cha B/122) attached.	ange of Correspondence	or agents OR, alternatively,					
☐ "Fee Address" ind	ication (or "Fee Address 2 or more recent) attack	(2) the name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.						
3. ASSIGNEE NAME A	ND RESIDENCE DATA	A TO BE PRINTED ON	THE PATENT (print or t	vpe)				
PLEASE NOTE: Unl	less an assignee is ident		data will appear on the	patent. If an assign	nee is io	dentified below, the do	cument has been filed for	
(A) NAME OF ASSI	GNEE		(B) RESIDENCE: (CIT	Y and STATE OR	COUNT	TRY)		
Please check the appropr	iate assignee category or	r categories (will not be p	rinted on the patent):	Individual 🗖 C	orporat	ion or other private grou	p entity 🚨 Government	
4a. The following fee(s)	are submitted:	4	b. Payment of Fee(s): (Pl		ny prev	viously paid issue fee sl	nown above)	
☐ Issue Fee ☐ Publication Fee (No small entity discount permitted) ☐ Advance Order - # of Copies			☐ A check is enclosed. ☐ Payment by credit card. Form PTO-2038 is attached.					
			The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any					
			overpayment, to Dep	posit Account Numb	er	(enclose an	extra copy of this form).	
5. Change in Entity Sta	tus (from status indicate is SMALL ENTITY stati		h Applicant is no le	onger claiming SMA	II EN'	ΓΙΤΥ status. See 37 CF	(2.1.27(a)(2))	
NOTE: The Issue Fee an	d Publication Fee (if rea	uired) will not be accepte	ed from anyone other than				assignee or other party in	
interest as shown by the	records of the United Sta	ites Patent and Trademark	c Office.					
Authorized Signature				Date				
	e		_					
This collection of inform	nation is required by 37 C	CFR 1.311. The information	on is required to obtain o	r retain a benefit by	the pub	lic which is to file (and	by the USPTO to process)	
an application. Confiden submitting the complete this form and/or suggest Box 1450, Alexandria, V Alexandria, Virginia 223	tiality is governed by 35 d application form to the ions for reducing this bu /irginia 22313-1450. DC 13-1450.	OU.S.C. 122 and 37 CFR E USPTO. Time will vary rden, should be sent to th D NOT SEND FEES OR	1.14. This collection is extending upon the induction office Chief Information OfficomPLETED FORMS	estimated to take 12 ividual case. Any c cer, U.S. Patent and TO THIS ADDRES	minutes ommen I Trader S. SEN	s to complete, including is on the amount of tim nark Office, U.S. Depar D TO: Commissioner fo	gathering, preparing, and e you require to complete tment of Commerce, P.O. or Patents, P.O. Box 1450,	

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450

P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILI	NG DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/551,708	10/03/2005		Kenji Fujii	F-8832 3875	
28107	28107 7590 05/05/2008		EXAMINER		
JORDAN ANI) HAMBU	MCMAHON, MARGUERITE J			
122 EAST 42NI	STREET			ART UNIT	PAPER NUMBER
SUITE 4000 NEW YORK, NY 10168				3747 DATE MAILED: 05/05/200	

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)

(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 519 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 519 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

	Application No.	Applicant(s)			
	10/551,708	FUJII, KENJI			
Notice of Allowability	Examiner	Art Unit			
	Marguerite J. McMahon	3747			
The MAILING DATE of this communication appeal All claims being allowable, PROSECUTION ON THE MERITS IS herewith (or previously mailed), a Notice of Allowance (PTOL-85) NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIOF the Office or upon petition by the applicant. See 37 CFR 1.313	(OR REMAINS) CLOSED in this a or other appropriate communicati IGHTS. This application is subject and MPEP 1308.	application. If not included on will be mailed in due course. THIS			
2. ☑ The allowed claim(s) is/are <u>1 and 2</u> .					
3. ☐ Acknowledgment is made of a claim for foreign priority under a) ☐ All b) ☐ Some* c) ☐ None of the: 1. ☐ Certified copies of the priority documents have 2. ☐ Certified copies of the priority documents have 3. ☐ Copies of the certified copies of the priority documents have a copies of the certified copies of the priority documents have a copies of the certified copies of the priority documents have a copies of the certified copies of the priority documents have a copies of the certified copies of the	e been received. e been received in Application No.				
* Certified copies not received: Applicant has THREE MONTHS FROM THE "MAILING DATE" noted below. Failure to timely comply will result in ABANDONN THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.	MENT of this application.				
 A SUBSTITUTE OATH OR DECLARATION must be subm INFORMAL PATENT APPLICATION (PTO-152) which give 					
5. CORRECTED DRAWINGS (as "replacement sheets") mus	st be submitted.				
(a) 🔲 including changes required by the Notice of Draftspers	son's Patent Drawing Review (PT	O-948) attached			
1) 🔲 hereto or 2) 🔲 to Paper No./Mail Date					
(b) ☐ including changes required by the attached Examiner's Paper No./Mail Date					
Identifying indicia such as the application number (see 37 CFR 1 each sheet. Replacement sheet(s) should be labeled as such in t					
 DEPOSIT OF and/or INFORMATION about the depo attached Examiner's comment regarding REQUIREMENT 					
Attachment(s) 1. ☑ Notice of References Cited (PTO-892)	5. Notice of Informa	l Patent Application			
2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)	6. ☐ Interview Summa	ry (PTO-413),			
3. Information Disclosure Statements (PTO/SB/08),	Paper No./Mail Date 7.				
Paper No./Mail Date 4. Examiner's Comment Regarding Requirement for Deposit of Biological Material	8. ⊠ Examiner's Stater 9. □ Other	ment of Reasons for Allowance			
	/Marguerite McMahon/ Primary Examiner, Art U	nit 3747			

Application/Control Number: 10/551,708 Page 2

Art Unit: 3747

REASONS FOR ALLOWANCE

The following is an examiner's statement of reasons for allowance: The prior art fails to teach or fairly suggest the claimed invention as a whole including a pair of supporting plates which are provided at parts adjacent both ends of the enhancing chamber, forming a plurality of holes, a supporting body attached both ends thereof to a center portion of said supporting plates, a plurality of supporting bars supported both ends thereof by said supporting plates, and a plurality of burned objects provided to each supporting bar, generating far-infrared radiation and negative ion, forming in the shape of a crescent moon in section, forming insertion holes for said supporting bars, corresponding to a size producing an inputting space of said fuel to an outer circumferential part of said supporting bar, generating far-infrared radiation and negative ion, in the context of a device for enhancing combustion efficiency of a fossil fuel supplied through a fuel-supply pipe to an engine and combustion device, providing the fuel-supply pipe and capable of enhancing the combustion efficiency of the fuel at the engine and combustion device, including a case, which is formed in the shape of a cylinder, having an enhancing chamber which has several times an internal diameter of said fuel-supply pipe thereinto, and both ends of said case provided at a sealing state, jointed pipes for inputting and outputting, which are attached to said both ends of said case or portions adjacent said both ends of said case, connecting with said enhancing chamber of said case and said fuel supply pipe, and a fuel-enhancing unit installed into said enhancing chamber of said case...

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marguerite J. McMahon whose telephone number is 571-272-4848. The examiner can normally be reached on Monday-Wednesday and Friday, 10am-6:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Steve Cronin can be reached on 571-272-4536. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Marguerite McMahon/ Primary Examiner, Art Unit 3747 Marguerite McMahon Primary Examiner Art Unit 3747 Application/Control Number: 10/551,708

Page 4

Art Unit: 3747